

IN THE SPECIFICATION

Please amend the paragraph that appears on page 7, line 15 through page 8, line 4 as follows:

01 The present invention is a low-cost, simple, circuit for detecting line voltage across tip and ring of a telecommunication subscriber loop that primarily utilizes circuitry that is commonly already incorporated in a data access arrangement (DAA) of telecommunication equipment. The circuit can be used to detect whether the line is in an off-hook condition and particularly can be used for disabling equipment from going off-hook if the line already is in use (i.e., off-hook) by another piece of telecommunication equipment. A preferred embodiment of the invention is particularly adapted for use in telecommunication equipment incorporating the CSP1035 Silicon DAA manufactured by ~~Lucent Technologies, Inc.~~ Agere Systems Inc. of ~~Murray Hill, New Jersey~~ Allentown, Pennsylvania, the assignee of the present application. However, TXN11, it will be obvious to those of skill in the telecommunication equipment field that the invention can be utilized with other DAA designs.

Please amend the paragraph that appears on page 8, lines 13 through 25 as follows:

02 The circuitry of the present invention is shown in Figure 2 and appears within dashed box 30 in Figure 2. Figure 2 also illustrates some of the circuitry that already commonly exists in a DAA and particularly the circuitry that is relevant to the operation of the inventive circuit 30. The detection circuit 30 comprises resistors R1 and R2, diode D1 and transistor Q1. In particular, resistors R1 and R2 comprise a resistor

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cont

voltage divider coupled between tip' and ring'. Note also that ring' is coupled to analog ground. The common node N1 between resistors R1 and R2 is coupled to the control terminal (the gate, in the case of a MOSFET) of transistor Q1. ~~Node N1~~ The common node also is coupled to a control signal line 40 through diode D1.

Please amend the paragraph that appears on page 10, lines 9 through 15: as follows:

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When the control signal is at logic low, ~~node N1~~ the common node is essentially coupled to ground, thus keeping transistor Q1 turned off. With transistor Q1 turned off, detection circuit 30 has no affect on the analog input of A/D converter 36. Accordingly, the AC signals from tip and ring are received by the A/D converter 36 without interference, which signals can be used for caller ID, ring detection, and similar functions.

Please amend the paragraph that appears on page 10, lines 16 through 24 as follows:

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When the control signal line goes high, diode D1 is essentially open circuited and the resistor divider formed by R1 and R2 will selectively turn transistor Q1 on or off. In particular, resistors R1 and R2 are ratioed relative to each other so that the voltage at ~~node N1~~ the common node is greater than the threshold voltage of Q1 when the voltage between tip' and ring' is at the on-hook voltage of the line and will be below the threshold voltage of transistor Q1 when the voltage between tip' and ring' is at the off-hook voltage level.

Please amend the paragraph that appears on page 13, line 22 through page 14, line 11 as follows:

95 Figure 4 is a partial block, partial schematic diagram of an exemplary DAA 100 incorporating the present invention. The circuitry of the second embodiment of the present invention is shown in dashed box 50. The aforementioned DSP and low power A/D converter are shown at 25 and ~~BR~~36, respectively. The DAA 100 further includes a digital bit output controller 107 which is the source of the aforementioned control signal 40 as well as other control signals in the DAA. The DAA further includes a full power receive A/D converter 101 and transmit D/A converter, both of which couple to the tip and ring line pair through circuitry 105 for conditioning signals. Circuitry 105 performs various functions, including hook switch line modulation, shunt regulation A/D and D/A interfacing. The DSP 25 receives the digital output data from the A/D converter 36 through a digital transmitter, shown as part of circuit 109, and a high voltage interface circuit 111.
